## **ABSTRACT**

A ultra-wide field of view head mounted display has been realized by integrating an ARC display component having a greater than about 70 degrees field of retro-reflection with an optical tiling display which provides a greater than about 80 degrees horizontal field of view by about 50 degrees vertical field of view whereby an overall binocular horizontal field of view greater than about 120 degrees is realized with a greater resolution than about 2 arc minutes. There is also taught a method of providing a wide field of view head mounted display by the steps of: combining an ARC display component and an optical tiling display; and, integrating said component and said tiling display whereby an overall field of view greater than about 120 degrees is realized.

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